National Aeronautics and Space Administration

Office of the Administrator Washington, DC 20546-0001



August 26, 2004

TO:

Distribution

FROM:

NASA Designated Agency Health and Safety Official

SUBJECT:

Outdoor Laser Use

NASA laser usage has increased over the years. Inter-agency laser safety and high-intensity light use issues between NASA and Department of Defense (DoD)/Federal Aviation Administration (FAA) are currently handled at the Center level. Individual Centers coordinate with regional FAA representatives and the U.S. Space Command in Colorado Springs, Colorado.

Controls are needed to assure uniform implementation of requirements and guidelines Agency-wide, and to assure that inadvertent damage from NASA laser and high-intensity light experiments and operations do not occur to either aircraft or spacecraft. A NASA policy is needed to preserve health and safety while allowing important research and operational work to continue.

Outdoor laser uses can generate light sources that produce an intense, coherent, directional beam of light that extends indefinitely into the navigable airspace. To better control these uses and reduce the risk to aircraft and DoD interests, Center Directors are requested to do the following:

- 1. Effect a comprehensive outdoor laser use assessment, and
- 2. Appoint a representative "Laser Safety Officer" (LSO) at their Centers.

The laser assessment must include a listing of <u>all</u> Class 3b and 4 outdoor laser uses as well as the following information: each laser user (point of contact) name and phone number, laser classification, laser output in milliwatts or watts, definition of the airspace to be affected (minimum and maximum elevation, and values for azimuth), laser Nominal Optical Hazard Distance (NOHD), laser beam divergence, type of laser including identification of pulsed or continuous wave, location of the laser, proximity of laser to airports or public access ways, and any additional information that may be pertinent in specific cases.

The person selected as the Center LSO should be trained in outdoor laser safety. Center LSOs and Center "Laser Safety Committees" (LSC) will enforce the attached temporary policy, as applicable to their Centers, until permanent-policy can be completed and approved.

Please provide the name of the point of contact to Guy Camomilli no later than September 21, 2004, at the following email address: Guy.Camomilli-1@ksc.nasa.gov.

If you have any questions or need additional information, please do not hesitate to contact Mr. Camomilli at (321) 867-1417.

Richard S. Williams, MD, FACS

Enclosure

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